

AMENDMENTS TO THE CLAIMS

The listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims

1. (Currently Amended) A method of positioning a radio transmitter characterized in that comprising:
~~determining distance to a receiver of known position is determined according to a parameter reflecting propagation delay time and that determining direction from the receiver to the transmitter is determined from a respective at least one parameter reflecting received signal level in a cell/sector where the transmitter is camping or being served and signal level in a co-sited cell/sector, the parameter determining direction from stored assisting position data.~~
2. (Currently Amended) The method according to claim 1, wherein characterized in that the assisting position data is classified in intervals of one or more parameters.
3. (Currently Amended) The method according to claim 2 wherein characterized in that the position data in each interval is averaged over the interval of each of the one or more parameters.
4. (Currently Amended) The method according to claim 3 wherein characterized in that the one or more parameters include received signal level.
5. (Currently Amended) The method according to claim 3 wherein characterized in that the one or more parameters include timing advance.
6. (Currently Amended) The method according to claim 3 wherein characterized in that the stored assisting position data is average position data.

7. (Currently Amended) The method according to claim 1 wherein e-h-a
~~characterized in that~~ the assisting position data is GPS or other satellite positioning
system position data.

8. (Currently Amended) The method according to claim 7 further
comprising e-h-a
~~characterized in that for a public mobile radio communication~~
~~system with a plurality of subscriber receivers, receiving~~ the assisting position data is
~~received from one or more of a plurality of subscriber receivers in a public mobile radio~~
communication system.

9. (Currently Amended) The method according to claim 1 wherein e-h-a
~~characterized in that~~ the co-sited cell/sector is at least one of the cells/sectors being
immediate neighbors of the cell where the transmitter is camping or being served.

10. (Currently Amended) The method according to claim 1 wherein e-h-a
~~characterized in that~~ direction to the transmitter is determined by forming a linear
scale ratio of or dB-scale difference between the neighbor cell/sector received level and
received level of the cell/sector where the transmitter is camping or being served.

11. (Currently Amended) The method according to claim 1 wherein e-h-a
~~characterized in that~~ determination of transmitter positioning includes cell/sector
identity.

12. (Currently Amended) The method according to claim 1 wherein e-h-a
~~characterized in that~~ the received signal level is averaged prior to forming a basis for
positioning.

13. (Currently Amended) The method according to claim 12 wherein e-h-a
~~characterized in that~~ the average is formed in a network control element.

14. (Currently Amended) The method according to claim 13 wherein e-h
a r a c t e r i z e d i n t h a t the network control element is an entity most closely connected to the receiver entity over a standardized interface.

15. (Currently Amended) The method according to claim 14 wherein e-h
a r a c t e r i z e d i n t h a t the entity most closely connected to the receiver is a base station controller.

16. (Currently Amended) The method according to claim 14 wherein e-h
a r a c t e r i z e d i n t h a t the entity most closely connected to the receiver is a radio network controller.

17. (Currently Amended) A device for of positioning a radio transmitter comprising: c h a r a c t e r i z e d b y

processing means for determining:
distance to a receiver of known position according to at least one parameter reflecting propagation delay time; and
direction from the receiver to the transmitter from a respective parameter reflecting received signal level in a cell/sector where the transmitter is camping or being served; and

signal level in a co-sited cell/sector, the r e s p e c t i v parameter determining direction from stored assisting position data; and

storage means for storing of assisting position data in relation to the at least one parameter.

18. (Currently Amended) The device according to claim 17 wherein e-h-a
r a c t e r i z e d i n t h a t the assisting position data is classified in intervals of one or more parameters.

19. (Currently Amended) The device according to claim 18 further comprising characterized by processing means for averaging position data in each interval over the interval of each of the one or more parameters.
20. (Currently Amended) The device according to claim 19 wherein characterized in that the one or more parameters include received signal level.
21. (Currently Amended) The device according to claim 19 wherein characterized in that the one or more parameters include timing advance.
22. (Currently Amended) The device according to claim 19 wherein characterized in that the stored assisting position data is average position data.
23. (Currently Amended) The device according to claim 17 wherein characterized in that the assisting position data is GPS or other satellite positioning system position data.
24. (Currently Amended) The device according to claim 17, wherein characterized in that for a public mobile radio communication system with a plurality of subscriber receivers, the assisting position data is received from one or more subscriber receivers.
25. (Currently Amended) The device according to claim 17 wherein characterized in that the co-sited cell/sector is at least one of the cells/sectors being immediate neighbors of the cell where the transmitter is camping or being served.
26. (Currently Amended) The device according to claim 17 wherein characterized in that direction to the transmitter is determined by forming a ratio of the neighbor cell/sector received level and received level of cell/sector where the transmitter is camping or being served.

27. (Currently Amended) The device according to claim 17 wherein e-h-a
~~racterized by~~ the processing means further comprises including cell/sector
identity determination of transmitter positioning.

28. (Currently Amended) The device according to claim 17 wherein e-h-a
~~racterized by~~ the processing means further comprises forming a time average of
received signal level prior to forming a basis for positioning.

29. (Currently Amended) The device according to claim 28 wherein e-h-a
~~racterized in that the time~~ average is formed in a network control element.

30. (Currently Amended) The device according to claim 29 wherein e-h-a
~~racterized in that the network control element is an entity most closely connected~~
to the receiver entity over a standardized interface.

31. (Currently Amended) The device according to claim 30 wherein e-h-a
~~racterized in that the entity most closely connected to the receiver is a base~~
station controller.

32. (Currently Amended) The device according to claim 30 wherein e-h-a
~~racterized in that the entity most closely connected to the receiver is a radio~~
network controller.

33 -34. (Canceled)